

H 6631

to

H 6664 inclus.

Station No. H 6631 Date: July 14 1916

Hour: 6:00 A. M. to — . M.

Position: Lat. 32-38-50 Long. 119-09-20
Chart 5002

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

1264

[illegible]

11-5314

NOTES

Psych. W ~~12.6~~
13.7

D 15.4

Station No. *H6632*Date: *July 17*191*6*Hour: *8:07:00* A. M. to *8:47:00* . M.

Position: Lat. _____

Long. _____

Locality: _____

Depth: _____

Bottom: _____

Sample: _____

Wind: Direction, _____

Force, *0-1*Sea: *S*Sky: *B*

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|--------------|------------------------------|-----------------|---------------|------------------|-------------------------------|----------------|----------------|
| <i>Surf.</i> | <i>Raufer 7486</i> | <i>16.5°</i> | <i>—</i> | <i>0</i> | <i>16.5</i> <i>(61.7)</i> | <i>X</i> | |
| <i>10 M.</i> | <i>N2. 165868</i> | <i>#1-14.5°</i> | <i>15.0°</i> | <i>(3) -0.05</i> | <i>14.45</i> <i>(58.0)</i> | <i>} 14.95</i> | |
| | <i>N2. 165869</i> | <i>#2-15.6°</i> | <i>14.8°</i> | <i>-0.05</i> | <i>15.55</i> <i>(59.9)</i> | | |
| <i>30 M.</i> | <i>N2. 165871</i> | <i>#1-13.0°</i> | <i>15.3°</i> | <i>-0.13</i> | <i>12.87</i> <i>(55.2)</i> | <i>} 12.83</i> | |
| | <i>Rtr. 37572</i> | <i>#2 12.8°</i> | <i>15.0°</i> | <i>0</i> | <i>12.8</i> <i>(55.0)</i> | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water: _____

Transparency: _____

REMARKS: *Lying to*

11-5314

C. E. DeLong
Recorder

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|------------------------------|----------|------|------|-------|
| | | Down | Up | |
| Surface #12-000 | 0 meters | 8:07 | 8:19 | |
| Serial Closing apparatus #11 | 10 | 8:11 | 8:27 | |
| Serial Closing apparatus #11 | 30 | 8:11 | 8:42 | |
| Serial Closing apparatus | | | | |

11-5314

NOTES

1st messenger down at 8:11:00 am
 2nd " " " 8:26:00 am

7⁴⁵ am Surface haul, surf. sample
 W ~~13.7~~^{13.8} D 15.3
 Surf. 16.6 (no connection)

8²⁶ By. W ~~13.7~~^{13.8} D 15.4
 13.8

Drifted from

Lat 32-37-00

Long 119-17-40

to

Lat 32-32-00

Long 119-20-00

NETS, ETC., USED

| Description | Depth | TIME <i>am</i> | | Speed |
|----------------------------------|-------|-------------------|------|-------|
| | | Down | Up | |
| Surface # 12 ²⁴ # 000 | 0 | 8:47 | 9:02 | |
| Serial Closing apparatus | 10 | 8:52 | 9:08 | |
| Serial Closing Apparatus | 30 | | | |

11-5314

NOTES

1st Messenger down at 8:52:00 am
 2nd Messenger down at 9:07:00 am

Psych. W 14.0
 14.1

DIS. 7

191/6

Long.

Sample:

Force, 0-1

Sky: AD

Transparency:

11—5314

C. B. DeLong.
Recorder.

NETS, ETC., USED

| Description | Depth | TIME <i>Am</i> | | Speed |
|---|-------|-------------------|------|-------|
| | | Down | Up | |
| Surface #12 ³ / ₄ # 000 | 0 | 9:25 | 9:40 | |
| Serial Closing Apparatus #1 | 10 | 9:28 | 9:44 | |
| Serial Closing Apparatus #1 | 30 | 9:28 | 9:49 | |

11-5314

NOTES

1st Messenger down at 9:28:00 am
 2nd Messenger down at 9:43:00 am

Psy. W ~~14.0~~ D 15.7
 14.1

Date: July 14 1916

Hour: 9:57 A. M. to 10:22 A. M.

Position: Lat.

Long.

Locality:

Depth:

Bottom:

Sample:

Wind: Direction,

Force, 0 - 1

Sea: *2*

Sky: 9 to 9

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|----------------------------|----------------|-----------------|--------------------|-----------|----------------|
| Surf. | Ranfac 7496 | 15.6° | | 0 | 15.6 (60.1) | | |
| 10 M. | NZ 165868 | #1-13.8° | 15.4° | -0.07 | 15.35 (59.6) | } 15.00 | #5 |
| | NZ 165869 | #2-14.7 | 16.3 (P) | -0.05 | 14.65 (58.4) | | |
| 30 M. | NZ 165871 | #1-11.5° | 15.2° | -0.14 | 11.36 (52.45) | } 11.35 | |
| | Rtr 37572 | #2-11.36° 35.5 11.35 | 16.2° 11.35 | -0.02 | 11.33 (52.4) | | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

C. E. Long.
Recorder.

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|--------------------------|-------|-------|-------|-------|
| | | Down | Up | |
| Surface #15 - 100 | 0 | 9:57 | 10:11 | |
| Serial Closing Apparatus | 10 M. | 10:00 | 10:15 | |
| Serial Closing Apparatus | 20 M. | 10:00 | 10:20 | |

11-5314

NOTES

1st Messenger down at 10:00 am
2nd Messenger down at 10:10 am

Psy. W 4.3 D 16.7
14.4

Station No. *H 6632* Date: *July 14* 191*6*

Hour: *10:28* a.m. to *10:48* a.m.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force, *0-1*

Sea: *X* Sky: *B*

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|--------|------------------------------|------------------|---------------|-----------------|--------------------|-----------|----------------|
| ... | "Ranfac" 7466 | 15.6° | | 0 | 15.6 (60.1) | | |
| 30 fms | N2 165868 | 11 - 12.2° 14.8° | | -0.08 | 12.12 (53.8) | } | 54.45 |
| | N2 165869 | "2 - 12.9° 15.0° | | -0.08 | 12.82 (55.1) | | |
| 20 fms | N2 165871 | 10.1° 16.0° | | -0.12 | 9.98 (50.0) | } | 9.94 |
| | Rtr 21572 | 9.98° 13.4° | | -0.04 | 9.94 (50.0) | | |
| | | 5.11 | | | | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water: Transparency:

REMARKS: 11-5314

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NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|--------------------------|-------|-------|-------|-------|
| | | Down | Up | |
| Surface #12 - #000. | 0 | 10:26 | 10:40 | |
| Serial Closing apparatus | 302 | 10:28 | 10:44 | |
| Serial Closing apparatus | 502 | 12:28 | 10:48 | |

11-5314

NOTES

1st messenger down at 10:26
2nd messenger down at 10:28

125.4
14.7
D 17.4

Station No. *H 6632*Date: *8. 14*191*6*Hour: *10:56 a. M.* to *11:17 a. M.*

Position: Lat. _____ Long. _____

Locality: _____

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, *0-1*Sea: *2* Sky: *Q*

TEMPERATURES

| Depth | Thermometer -- Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|--------------|--------------------------------|------------------|---------------|-----------------|------------------------|----------------|----------------|
| <i>Surf</i> | <i>Renf 7486</i> | <i>15.6°</i> | | <i>0</i> | <i>15.6 (60.1)</i> | | |
| <i>537 f</i> | <i>N2 165866</i> | <i>11-16.4°</i> | <i>14.8°</i> | <i>-0.08</i> | <i>11.32 (52.4)</i> | } <i>11.52</i> | |
| | <i>N2 165869</i> | <i>#2-11:80°</i> | <i>14.8°</i> | <i>-0.08</i> | <i>11.72 (53.1)</i> | | |
| <i>912 f</i> | <i>N2 165866</i> | <i>10:0</i> | <i>14.8°</i> | <i>-0.08</i> | <i>9.92 (49.8)</i> | } <i>9.80</i> | |
| | <i>RTR 37572</i> | <i>#2-9.78°</i> | <i>14.8°</i> | <i>-0.04</i> | <i>9.74 (49.5)</i> | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |
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| | | | | | | |

Color of water: _____

Transparency: _____

REMARKS: _____

11-5314

W. B. Long
P. B. Long

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------------------|-------|-------|-------|-------|
| | | Down | Up | |
| Sub. 12 - " 000 | 0 | 10:53 | 11:09 | |
| Serial diving apparatus | 30 | 10:56 | 11:12 | |
| Serial diving apparatus | 50 | 10:56 | 11:12 | |

11-5314

NOTES

1st Messenger down at 10:56:00
2nd Messenger down at 11:11

Psy. W ~~14.6~~ D 17.4
14.7

Station No. *H6632* Date: *July 17* 191*6*

Hour: . M. to . M.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force, *0-1*

Sea: *X* Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------------|------------------------------|-------------|---------------|-----------------|------------------------|----------------|----------------|
| <i>Surf</i> | <i>Rafae 7486</i> | <i>15.9</i> | <i>—</i> | <i>0</i> | <i>15.9 (60.6)</i> | <i>X</i> | |
| | <i>N2 16556</i> | <i>10.2</i> | | <i>-0.06</i> | <i>10.14 (50.3)</i> | <i>} 10.82</i> | |
| | <i>N2 16567</i> | <i>10.2</i> | | <i>-0.1</i> | <i>10.1 (50.2)</i> | | |
| | <i>N2 16571</i> | | | <i>-0.15</i> | <i>9.75 (49.5)</i> | <i>} 9.71</i> | |
| | <i>RTR 37572</i> | <i>9.7</i> | <i>14.10</i> | <i>-0.03</i> | <i>9.67 (49.4)</i> | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water: Transparency:

REMARKS:

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|----------------|-------|-------|-------|-------|
| | | Down | Up | |
| Surface 12-000 | | | | |
| | | | 11:40 | |
| | | 11:50 | 11:44 | |

11-5314

NOTES

1000 fathoms down at 11:40 and
 not hauled down at 11:44

Psy. W ~~14.2~~ D 16.4
 14.3

Station No. H 6632 Date: July 1, 191

Hour: 12.57 P. M. to 1.18 P. M.

Position: Lat. _____ Long. _____

Locality: _____

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: (N) Sky: (O)

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|---------------|----------------|
| | <i>Ran...</i> | | | 0 | <i>(59.9)</i> | | |
| | <i>121556</i> | | | -0.07 | <i>10.8</i> | <i>51.5</i> | <i>10.80</i> |
| | <i>121557</i> | | | -0.07 | <i>10.8</i> | <i>(51.4)</i> | |
| | <i>16571</i> | | | -0.15 | <i>10.8</i> | <i>(48.4)</i> | <i>9.60</i> |
| | <i>121572</i> | | <i>5</i> | -0.03 | <i>10.8</i> | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water: _____ Transparency: _____

REMARKS: _____

*11213-Black
Pick*

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|-------|------|-------|
| | | Down | Up | |
| | — | 12.57 | 1.09 | |
| | 30-71 | 12.57 | | |
| | " | 1.12 | 1.13 | |
| | " | 1.12 | 1.13 | |

11-5314

NOTES

2d

Psy. W ~~44.8~~ D 17.6
14.9

Station No. H6632 Date: July 14 1916

Hour: 1.26 P. M. to 1.47 P. M.

Position: Lat. _____ Long. _____

Locality: _____

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: S Sky: C

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 7446 | 16.3 | | 0 | 16.3 (61.3) | | |
| | 165312 | | | -0.06 | 16.24 (59.6) | } 10.56 | |
| | 165314 | | | -0.02 | 16.22 (59.6) | | |
| 10.00 | 165371 | 16.3 | | -0.06 | 16.24 (59.6) | } 9.47 | |
| 10.00 | 165372 | 16.3 | | -0.06 | 16.24 (59.6) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water: _____ Transparency: _____

REMARKS: _____ 11-5314

Station No. 11-6637 Date: 11/11/1911

Hour: 1:55 P. M. to 2:10 P. M.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| | 165915 | 16.3 | | | 16.3 (61.3) | | |
| | 165915 | 11.2 | | -0.04 | 11.11 (52.0) | } | 11.15 |
| | 165915 | 11.2 | | -0.04 | 11.11 (52.0) | | |
| 50-51 | N7 165971 | 9.8 | 13.8 | -0.15 | 9.65 (47.4) | } | 9.6 |
| | 165972 | 9.8 | 13.8 | -0.15 | 9.65 (47.4) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water:

Transparency:

REMARKS:

Station No. *H-6632* Date: *July 14* 191*6*

Hour: *2.32* P. M. to *2.50* P. M.

Position: Lat. _____ Long. _____

Locality: _____

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: *N* Sky: _____

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|------------|------------------------------|-------------|---------------|-----------------|------------------------|-----------|----------------|
| <i>Sur</i> | <i>Ranfac 7486</i> | <i>16.2</i> | | <i>0</i> | <i>16.2 (61.2)</i> | | |
| <i>5</i> | | <i>none</i> | | | | <i>14</i> | |
| <i>10</i> | | | | | | <i>14</i> | |
| <i>15</i> | | | | | | <i>14</i> | |
| <i>20</i> | | | | | | <i>14</i> | |
| <i>25</i> | | | | | | <i>14</i> | |
| <i>30</i> | <i>NZ 95256</i> | <i>47.7</i> | | <i>-0.7</i> | <i>47.0 (833)</i> | <i>5</i> | <i>8.28</i> |
| <i>35</i> | <i>1095-1</i> | <i>47.9</i> | | <i>-1.0</i> | <i>46.9 (822)</i> | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water: _____

Transparency: _____

REMARKS: _____ 11-5314

10 N Bld Box
Recd

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|---------------|-------|------|----|-------|
| | | Down | Up | |
| Little's Horn | 3-7 | | | |
| Small Horn | | | | |

11-5314

NOTES

Pay V. 15.1
15.2

Station No. *H-6632* Date: *July 14* 191*6*

Hour: *3.01* P. M. to *3.14* P. M.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| 1 | SV. 805 | 15.2 | | +0.15 | 15.25 (59.7) | | 1 |
| 2 | NZ. 98260 | 15.2 | | +0.12 | 15.22 (59.0) | | |
| | NZ. 71738 | | | -0.5 | 16.5 (13.6) | | |
| 30 | SV 447 | | | -0.7 | 16.7 (13.72) | | |
| | NZ. 164895 | | | +0.04 | 12.34 (54.2) | | |
| | SV 446 | | | -0.17 | 9.5 (49.1) | | |
| | NZ. 164895 | | | -0.15 | 9.65 (49.4) | | |
| | NZ. 62855 | | | -0.7 | 17.8 (87.8) | | |
| | | | | -1.0 | 17.5 (81.6) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
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Color of water: Transparency:

REMARKS:

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|------|--------|
| | | Down | Up | |
| | | 3.12 | 7.12 | |
| | | | 3.14 | 40-712 |
| | | | 3.15 | 50-712 |
| | | | 3.19 | 75-712 |

11-5314

NOTES

76 Pay.

Average

1524

56.6 1369

12.26

9.58

47.65 890

1916

. M.

Chart 5002

Locality:

Sample:

Force,

Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 74186 | 16.6 | — | 0 | 16.6 (61.9) | ✓ | |

CURRENTS

[illegible]

Transparency:

11—5314

11—5314

Station No. 14625

Date: 12/11/17

1916

Hour: 5:00 P. M. to — . M.

Position: Lat. 32-48-30 Long. 119-13-00
Chart 5002

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: _____ Sky: _____

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 7486 | 16.9 | — | 0 | 16.9 (62.4) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS: Under way.

11—5314

Station No. *H 6636* Date: *July 17* ... 191*6*

Date: July 17

1916

Hour: 5:30 P. M. to — . M.

Position: Lat. 32-52-00 Long. 119-09-30

Chart 5002

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

NETS, ETC., USED

[illegible]

11—5314

NOTES

Station No. H 6637

Date: July 14

1916

Hour: 6:00 P. M. to

. M.

Position: Lat. 32-53-40

Long. 119. 04' - 120

Chart 5002

Locality:

Depth:

Bottom:

Sample:

Wind: Direction,

Force,

Sea:

Sky:

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

Station No. *H 6638* Date: *July 14* 191*6*

Hour: 7:00 P. M. to . M.

Position: Lat. 32-57-20 Long. 118-54-50
 61002

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf. | Ranfac 7486 | 17.7 | - | 0 | 17.7 (63.9) | X | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11-5314

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|----|-------|
| | | Down | Up | |
| | | | | |

11—5314

NOTES

Station No. H 6639 Date: July 14, 1916

Hour: 7:30 P. M. to — . M.

Position: Lat. 32-59-40 Long. 118-49-30
Chart 5002

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, Force,

Sea: _____ Sky: _____

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf. | Ranfac 7486 | 17.5 | — | 0 | 17.5 (63.5) | X | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5114

Station No. 416.

Date: 3/22/00

191/-

Hour: 8:00 P. M. to — M.

Position: Lat. 33-02.00 Long. 118-14-30

Chem 5002

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

Station No. 116.100

Date: 7/1/77

1914

Hour: 8:30 P. M. to - M.

Position: Lat. 34-04-30 Long. 118-20-10
Chart 5700

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: **Sky:**

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11—5314

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|----|-------|
| | | Down | Up | |
| | | | | |

11-5314

NOTES

Station No. H 6643Date: July 14

1916

Hour: 9:30 P. M. to

. M.

Position: Lat. 33-09-00
Chart 5100

Long. 118-30-10

Locality:

Depth: 1000 Bottom: Sample:

Wind: Direction, _____ Force, _____

Sea: **Sky:**

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11—5314

Station No. 14 6100

Date: July 1, 1901

1916

Hour: 10:00 P. M. to . M.

Position: Lat. 23-40-40
Chart 5100

Long. 118 2 4 55

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: www.sea.com **Sky:** www.sky.com

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Barrett | 16.9 | — | — | 16.9 (62.6) | X | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

Station No. *H 6 16* Date: *July 1*

Date: July 2

1916

Hour: 11:00 P. M. to M.

Position: Lat. 33-13-25 Long. 118-14-15
Chart 5100

Locality:

Depth: Bottom: Sample:

Wind: Direction, _____ Force, _____

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11—5314

Station No. H 6647 Date: July 14 1916

Hour: 11:30 P. M. to — . M.

Position: Lat. $24^{\circ} 14' 55''$ Long. $115^{\circ} 05' 50''$

Locality:

Depth: Bottom: Sample:

Wind: Direction, _____ Force, _____

Sea: _____ Sky: _____

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Hayden | 16.15 | - | 0 | 16.15 (61.1) | X | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11—5314

1916.

Hour: 12:00 midnight . M. to — . M.

Position: Lat. 33-18-55 Long. 118-08-30

Chart 51.012

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranget 486 | 18.6 | - | 0 | 18.6 (65.8) | X | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

Station No. *H 100*

Date: 7/11/01

1916

Hour: 10:30 A. M. to - . M.

Position: Lat. Long.

Locality: *St. F. ...*

Depth: Bottom: Sample:

Wind: Direction, _____ Force, _____

Sea: Sky:

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11—5314

Station No. 116652

Hour: 12:00 ^{noon} . M. to - . M.

Position: Lat. _____ Long. _____

Locality: _____

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: **Sky:**

TEMPERATURES

[illegible]

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

Station No. *H 6653*

Date: July 17

1916

Hour: 17:30 P. M. to ~

. M.

Position: Lat. _____ Long. _____

Locality:

Depth: _____ Bottom: _____ Sample: _____

Wind: Direction, _____ Force, _____

Sea: **Sky:**

TEMPERATURES

| Depth | Thermometer - Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|-------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 7456 | 19.0 | — | 0 | 19.0 (66.2) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|----|-------|
| | | Down | Up | |
| | | | | |

11-5314

NOTES

Reg. 11 46.7
16.8

D 10.1

79%

about 5200
Net frame 11.1/10.1
10.7 min.

1916

. M.

Long.

Locality:

Sample:

Force,

Sky:

TEMPERATURES

[illegible]

CURRENTS

[illegible]

Color of water:

Transparency:

. 11—5314

Station No. *A 6655*

Date: July 7

1916

Hour: 1130 P. M. to . M.

Position: Lat. _____ Long. _____

Locality:

Depth: Bottom: Sample:

Wind: Direction, _____ Force, _____

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

NETS, ETC., USED

[illegible]

11-5314

NOTES

Psy. W46.2 D19.2 74%

Chart 5200

Point Name N 30 E (True)

9.4 mi.

Station No. H 6656 Date: July 17 1916

Hour: 7:00 P. M. to — . M.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: _____ Sky: _____

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 1446 | 19.2 | — | 0 | 19.2 (66.6) | | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

Station No. H 6657 Date: July 17, 1916

Hour: 2:30 P. M. to - . M.

Position: Lat. _____ Long. _____

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|----|-------|
| | | Down | Up | |
| | | | | |
| | | | | |
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| | | | | |
| | | | | |

11-5314

NOTES

By 11 44 00 83%
16.2

Chart 5200

Point Barre 71 64 E (True)

13.4 mi.

Station No. *H 6658*

Date: July 17

1916

Hour: 3:00 P. M. to - . M.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, _____ Force, _____

Sea: _____ Sky: _____

TEMPERATURES

[illegible]

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11—5314

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|----|-------|
| | | Down | Up | |
| | | | | |

11-5314

NOTES

Psy. W 15.4 D 17.7
16.0

84%

chart 5200

Lucerne Lt

71.18 W (True)

14.1 mi.

Station No. H 6659

Date: July 17 1916

Hour: 3:30 P. M. to - . M.

Position: Lat. Long.

Locality:

Depth: Bottom: Sample:

Wind: Direction, Force,

Sea: _____ Sky: _____

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Raufer 7486 | 17.3 | — | 0 | 17.3 (63.1) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Color of water:

Transparency:

REMARKS:

191/

. M.

Long.

Locality:

Sample:

Force,

Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | W. 100111 | 15.9 | — | 0 | 15.9 (60.6) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Transparency:

REMARKS:

Date: July 17, 1916

. M.

Long.

Locality:

Sample:

Force,

Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf. | Ranfac 7486 | 16.2 | — | 0 | 16.2 (61.2) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Transparency:

REMARKS:

1916

. M.

Long.

Depth: Bottom: Sample:

Force,

Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 7486 | 17.4 | — | 0 | 17.4 (63.3) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |

Transparency:

REMARKS:

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-------------|-------|------|----|-------|
| | | Down | Up | |
| | | | | |
| | | | | |
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| | | | | |
| | | | | |

11-5314

NOTES

Psy. W 15.4 D 17.3 83%

chart 5200

San Pedro Lt (Santa Cruz Id)
 72 46 W (True)
 2.5 mi.

Station No. *H 6664*Date: *July 18*191 *6*Hour: *5:27 A.M.* to *5:51 A.M.*

Position: Lat. _____ Long. _____

Locality: *South Long Id. (Smuggler's Cove)*Depth: *9 1/2 fms* ^{*17 1/2 m*} Bottom: _____ Sample: _____Wind: Direction, *S.E.* Force, *1*Sea: *G.* Sky: *02 - 95 - 10*

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------------|------------------------------|--------------|---------------|-----------------|-------------------------|-----------|----------------|
| <i>Surf</i> | <i>Ranfac 7496</i> | <i>16.10</i> | <i>—</i> | <i>0</i> | <i>16.10 (60.8)</i> | | |
| <i>5 m</i> | | <i>11: —</i> | | | | | |
| | | <i>12: —</i> | | | | | |
| <i>10 m</i> | | <i>11: —</i> | | | | | |
| | | <i>12: —</i> | | | | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |

Color of water: _____

Transparency: _____

REMARKS: _____

11—5314

*Arutit -
Reamda*

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|--------------------|-------|------|------|-------|
| | | Down | Up | |
| Surface 4 15-45 am | Surf. | 5:27 | 5:48 | 1.0 |
| Sur. C's. 100 ft | 500. | 5:27 | 5:48 | |
| Sur. C's. 100 ft | 1000. | 5:48 | 5:51 | |

11-5314

NOTES

Small Dredging Bag. ...
 5:20

1st messenger down at 5:27 am.
 25 " " " 5:48

54% Psy. W. 15.6 D. 17.3 85%

Lat 5 12 6

Pt South of San Miguel Cove
 Santa Cruz Isl

552W (True)
 0.3 mi

Station No. 55 6664 Date: July 18th 1916

Hour: 6:02 A.M. to 6:20 A.M.

Position: Lat. Long.

Locality: Santa Cruz Island

Depth: 9 1/2 fms. Bottom: Sample:

Wind: Direction, SE Force, 1

Sea: G. Sky: 03 - 95 - 10

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 7446 | 16.1 | — | 0 | 16.1 (61.0) | | |
| 5 M | N2 165868 | 15.9 | 16.0 | -0.05 | 15.85 (60.5) | | 15.95 |
| | 117 165869 | 16.1 | 16.0 | -0.05 | 16.05 (60.9) | | |
| 10 M | N2 165871 | 15.1 | 15.8 | +0.1 | 15.6 (60.1) | | |
| | 117 3751 | 15.1 | 15.8 | +0.1 | 15.6 (60.1) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11-5314

Shore 11
K. C. ...

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|------------------------|---------|------|------|-------|
| | | Down | Up | |
| Surface net 15 ft. net | Surface | 6:02 | 6:15 | 1 1/2 |
| Sec. net 15 ft. net | 5 m | 6:03 | 6:18 | |
| Sec. net 15 ft. net | 10 m | 6:17 | 6:30 | |

11-5314

NOTES

Small net 15 ft. net; 15 ft. net.
 1 ft. net 15 ft. net; 15 ft. net.
 1 ft. net 15 ft. net; 15 ft. net.

1 ft. net 15 ft. net; 15 ft. net.

Station No. 15 554

Date: July 18 1916

Hour: 6:31 A. M. to 6:50 A. M.

Position: Lat. Long.

Locality: Santa Cruz Island.

Depth: Bottom: Sample:

Wind: Direction, SE Force, 1

Sea: G Sky: 03 - AS - 10

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | Hydrol. 111 | 16.1 | - | 0 | 16.1 (61.0) | | |
| 572 | N2 145 868 N2 115 148 | 15.0 | - | - | 15.0 | | |
| 1072 | N2 145 868 N2 37572 | 15.25 | 15.0 | 16.00 | 15.29 (59.5) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |

Color of water:

Transparency:

REMARKS:

11-5314

Anchored -

P.

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|----------------------|-------|------|------|-------|
| | | Down | Up | |
| Tow net 12 x 100 | Surf. | 6:31 | 6:40 | 1.5 |
| Ser. Ch. net 4' x 1' | 5 m. | 6:31 | 6:40 | 1.5 |
| Ser. Ch. net 4' x 1' | 10 m. | 6:40 | 6:50 | 1.5 |

11-5314

NOTES

Small air. eng.; ship at anchor.

1st messenger down at 6:31 am
2d " " " " " 6:46 "

6⁴⁶/_{am} Psy. W 15.5 D 17.1 86.8

Station No. 1314

Date: Jan 10

1916

Hour: 6:59 A. M. to 7:17 A. M.

Position: Lat. Long.

Locality: Santa Cruz Id.

Depth: 9 1/2 fms. Bottom: Sample:

Wind: Direction, East Force, 1

Sea: G. Sky: B - AS - 10

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|--------|------------------------------|---------|---------------|-----------------|--------------------|-----------|----------------|
| Surf | 112 16586 | 16.1 | — | 0 | 16.1 (61.0) | | |
| 5 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |
| 10 fms | 112 16586 | 15.0 | 16.0 | -0.5 | 15.5 (60.3) | | |

CURRENTS

| Depth | Hour | Tide | Time down | Revolutions | Speed | Direction |
|-------|------|------|-----------|-------------|-------|-----------|
| | | | | | | |
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Color of water:

Transparency:

REMARKS:

11-5314

Stratified - Rec.

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|-----------------------|-------|--------------------|--------------|-------|
| | | Down | Up | |
| Tow Nets # 12 and 000 | Surf | 6:59 ^{am} | 7:14 | 2 |
| Sw. Clo. App. No 1 | 5 m. | 6:59 | 7:15 7:14 | |
| Sw. Clo. App. No 2 | 10 m. | 7:14 | 7:17 7:17 | |

11-5314

NOTES

Small Dr. eng.; at anchor.

1st messenger down at 6:59 am.
2 " " 7:14 "

7¹⁴ am Psy W 15.7 D 17.4 87.8
S

191

740 57. M.

Long.

Locality: Santa Cruz I. d.

Sample:

Force,

Sky:

TEMPERATURES

| Depth | Thermometer— Make and No. | Reading | Stem Temp. | Correc- tion | Corrected Temp. | W. Sample | Bottle used |
|-------|------------------------------|---------------------|-----------------|-----------------|--------------------|-----------|----------------|
| Surf | Ranfac 7486 | 16.1 | — | 0 | 16.1 (61.0) | | |
| 5 m | N2 165868 | #1: 15.9 | 15.3 | -0.05 | 15.85 (60.5) | | |
| | N2 165869 | #2: 15.9 | 15.3 | -0.05 | 15.85 (60.5) | | |
| 10 m | N2 165871 | #1: 15.7 | 15.3 | | — | | |
| | Rtr 37572 | #2: 15.7 | 16.3 | +0.04 | 15.74 (60.3) | | |

CURRENTS

[illegible]

Color of water:

Transparency:

REMARKS:

11—5314

NETS, ETC., USED

| Description | Depth | TIME | | Speed |
|---------------------|-------|------|------|---------------|
| | | Down | Up | |
| Tow Net No 12 & 000 | surf. | 7:25 | 7:40 | $\frac{1}{2}$ |
| Sec. Clo. App. No 1 | 5 m. | 7:25 | | |
| Sec. Clo. App. No 2 | 10 m. | 7:40 | | |

11-5314

NOTES

Sml. dr. eng.; ship at anchor.

1st messenger down at 7:25 am.
 2 " " 7:40 "

7⁴⁰ am Psy W 15.6 D 17.4 84%
 7

$\frac{9}{5} + 32$